

## FLASH MEMORY SECTOR TAGGING FOR CONSECUTIVE SECTOR ERASE OR BANK ERASE

### RELATED APPLICATION

[0001] This application is a continuation application of United States Patent Application <sup>now U.S. Patent No. 6,717,862,</sup> Serial Number 10/229,921 (allowed), filed August 28, 2002, entitled "FLASH MEMORY SECTOR TAGGING FOR CONSECUTIVE SECTOR ERASE OR BANK ERASE," which application is commonly assigned and claims priority to commonly assigned Italian Patent Application Serial No. RM2001A000530 filed August 31, 2001.

### TECHNICAL FIELD OF THE INVENTION

[0002] The present invention relates generally to semiconductor memory devices, and in particular, the present invention relates to sector tagging for erase operations in flash memory devices.

### BACKGROUND OF THE INVENTION

[0003] Semiconductor memory devices are rapidly-accessible memory devices. In a semiconductor memory device, the time required for storing and retrieving information generally is independent of the physical location of the information within the memory device. Semiconductor memory devices typically store information in a large array of cells.

[0004] Computer, communication and industrial applications are driving the demand for memory devices in a variety of electronic systems. One important form of semiconductor memory device includes a non-volatile memory made up of floating-gate memory cells called flash memory. Computer applications use flash memory to store BIOS firmware. Peripheral devices such as printers store fonts and forms on flash memory. Digital cellular and wireless applications consume large quantities of flash memory and are continually pushing for lower voltages and power demands. Portable applications such as digital cameras, audio recorders,